AT THE FOREFRONT
UChicago Medicine

Social Determinants of Health in Older Adults

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Disclosures

No relevant financial conflicts

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- Retirement Research Foundation
- Coleman Foundation
- Michigan Endowment Fund
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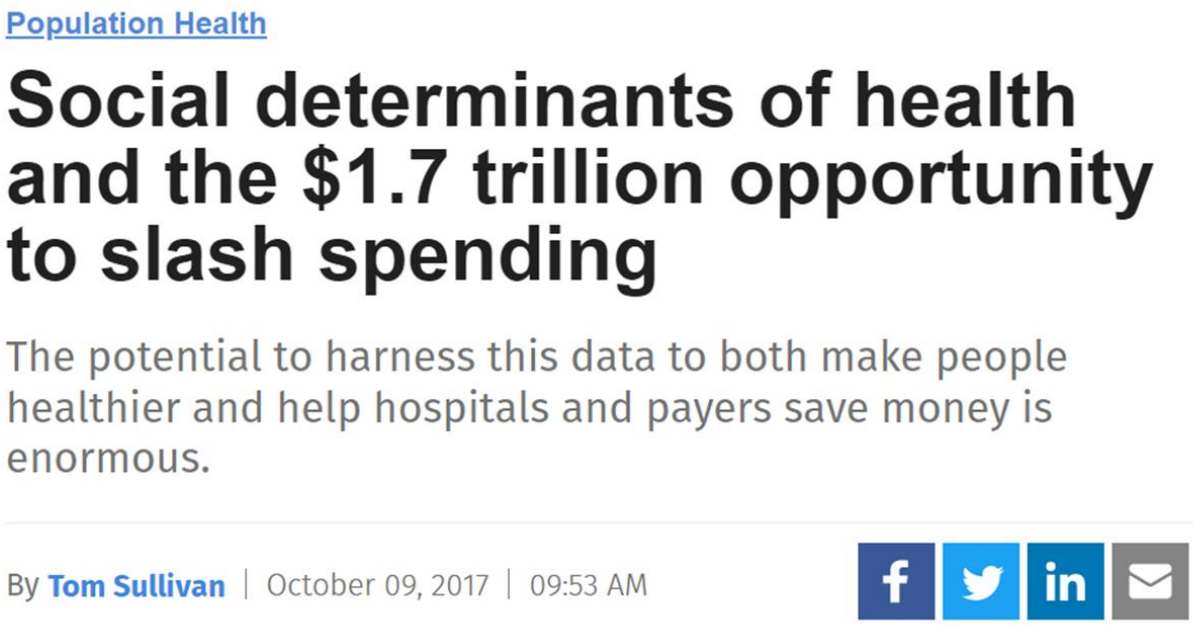
- AHRQ 1R18HS027910-01

Objectives

- Describe key socio-economic factors that play a role in health outcomes in older Americans.
- Define clinical practice strategies that can screen for important social determinants and integrate resources into practice settings.
- Describe how clinician leaders can improve social determinants in the communities where they live and practice.

Social Determinants of Health (WHO 2012)

"the conditions in which people are born, grow, live, work and age," which are "shaped by the distribution of money, power and resources."



Population Health

Social determinants of health and the $1.7 trillion opportunity to slash spending

The potential to harness this data to both make people healthier and help hospitals and payers save money is enormous.

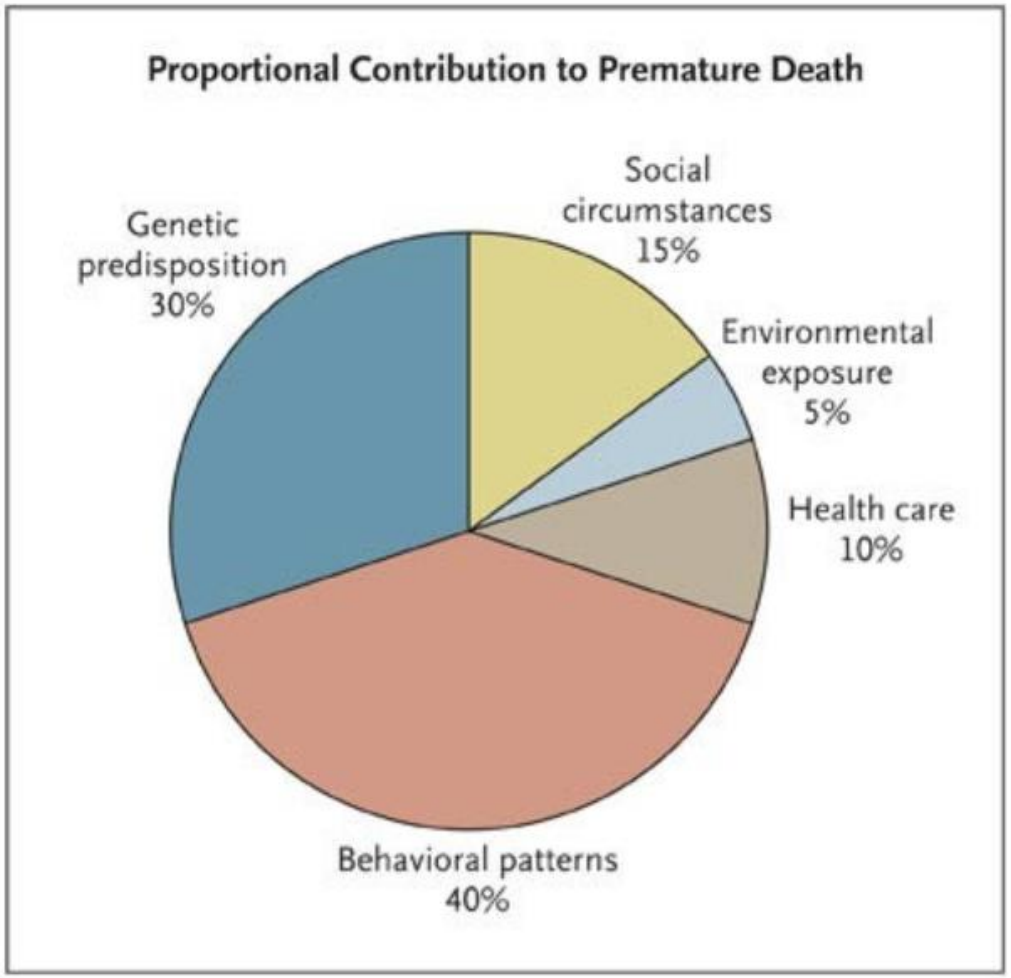
By Tom Sullivan | October 09, 2017 | 09:53 AM

90% of health is determined by factors outside of the health system

SPECIAL ARTICLE SHATTUCK LECTURE

We Can Do Better — Improving the Health of the American People

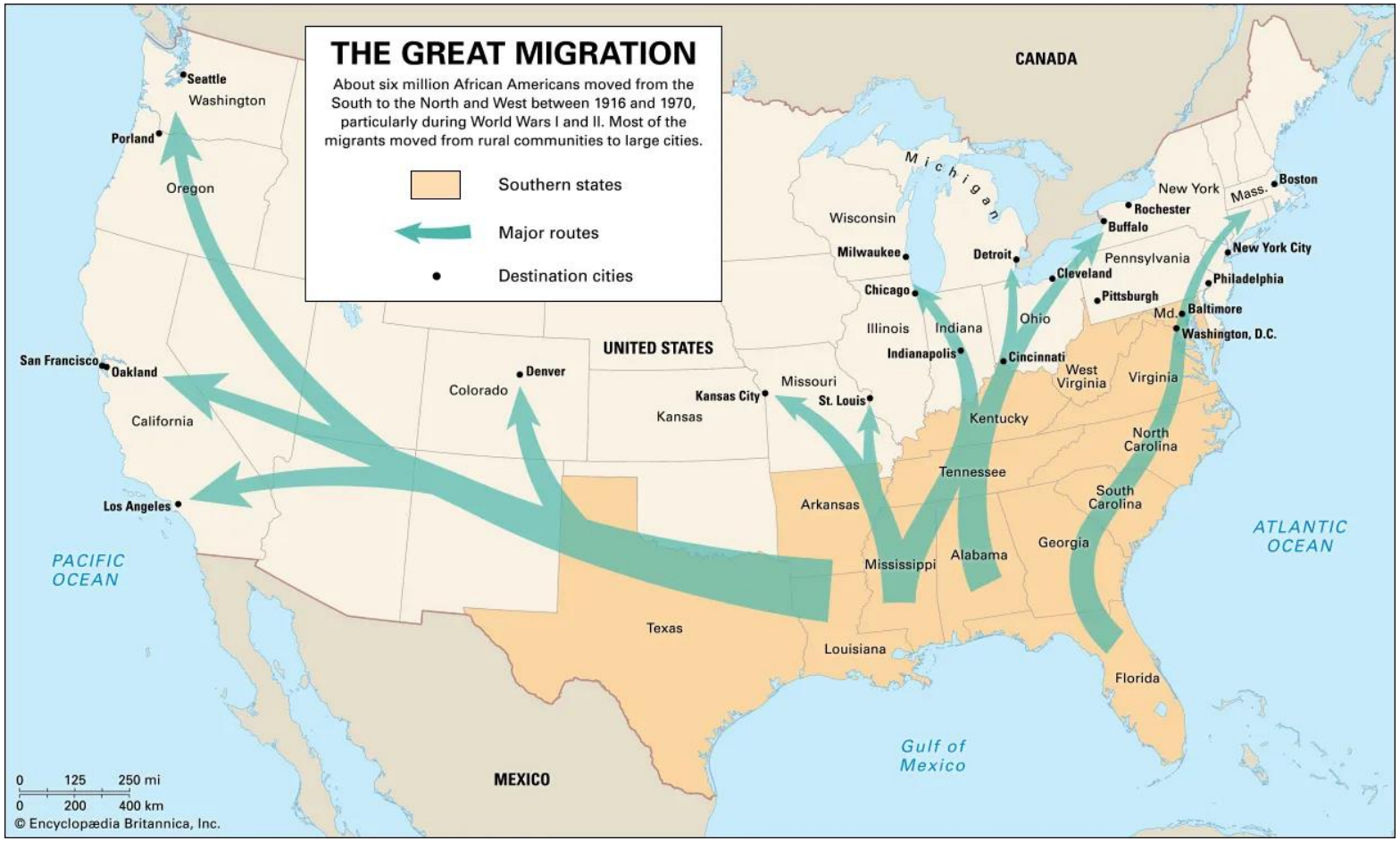
Steven A. Schroeder, M.D.



Chicago's south side: steeped in culture and history

Figure 7. A word cloud of community strengths, showing the 75 most common words used by survey respondents

Chicago's south side: steeped in culture and history



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	Chicago	South Side
PCP per 1,000	1.0	0.49

	Chicago	South Side
Percentage 65+	11%	14%

	Nation wide	South Side
65+ in Poverty	9%	18%

Mr. T's story

(2006-2021)

- High school graduation
- Enrollment in higher education
- Language & Literacy
- Early childhood education

- Access to health
- Access to primary care
- Health literacy

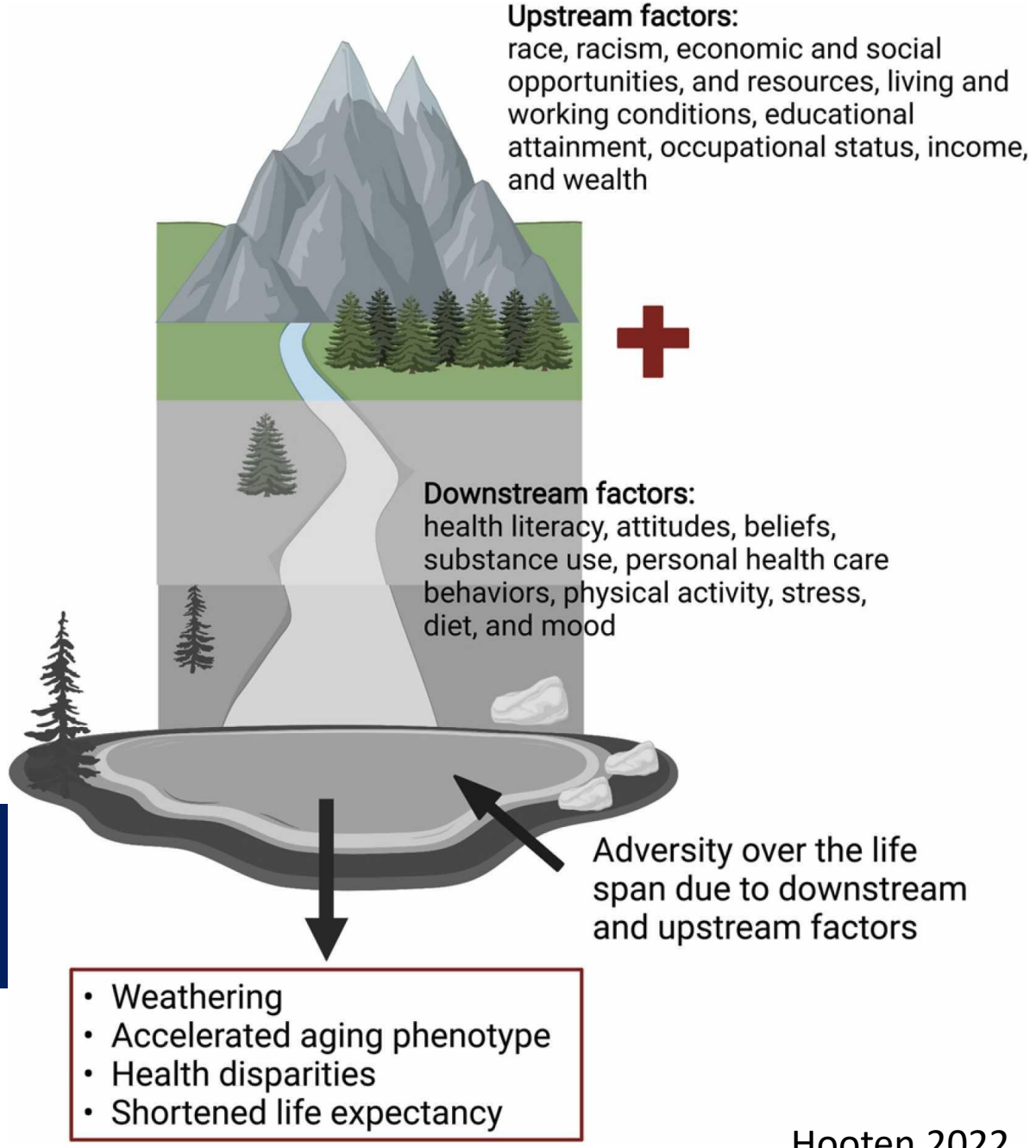
- Poverty
- Employment
- Food Security
- Housing stability

- Access to healthy foods
- Quality of housing
- Crime & violence
- Environmental conditions

- Social cohesion
- Civic participation
- Perceptions of discrimination & equality
- Incarceration

Social Determinants of Health
Copyright-free
Healthy People 2030

Upstream and downstream determinants of health influence outcomes over the lifespan



"Weathering"
The physical consequences of social disadvantage

Hooten 2022

See discussions, stats, and author profiles for this publication at: https://www.researchgate.net/publication/287296213

Social determinants of health in older age

Article · January 2009

DOI: 10.1093/acprof:oso/9780198565895.003.13

"The most consistent relationship among studies in the US is that educational attainment is inversely related to physical disability in older age in both cross-sectional and longitudinal studies"

(after adjusting for baseline function and other socioeconomic indicators)

Professor Sir Michael Marmot, UK

AARP Foundation

National representative survey 1600 adults, > age 50

One unmet social need: 50%
Two or more unmet social needs: 28%

Loneliness 22%
Food insecurity 16%
Inadequate transportation 12%
Strained financial resources 23%
Living alone 22%

The SDH cascade

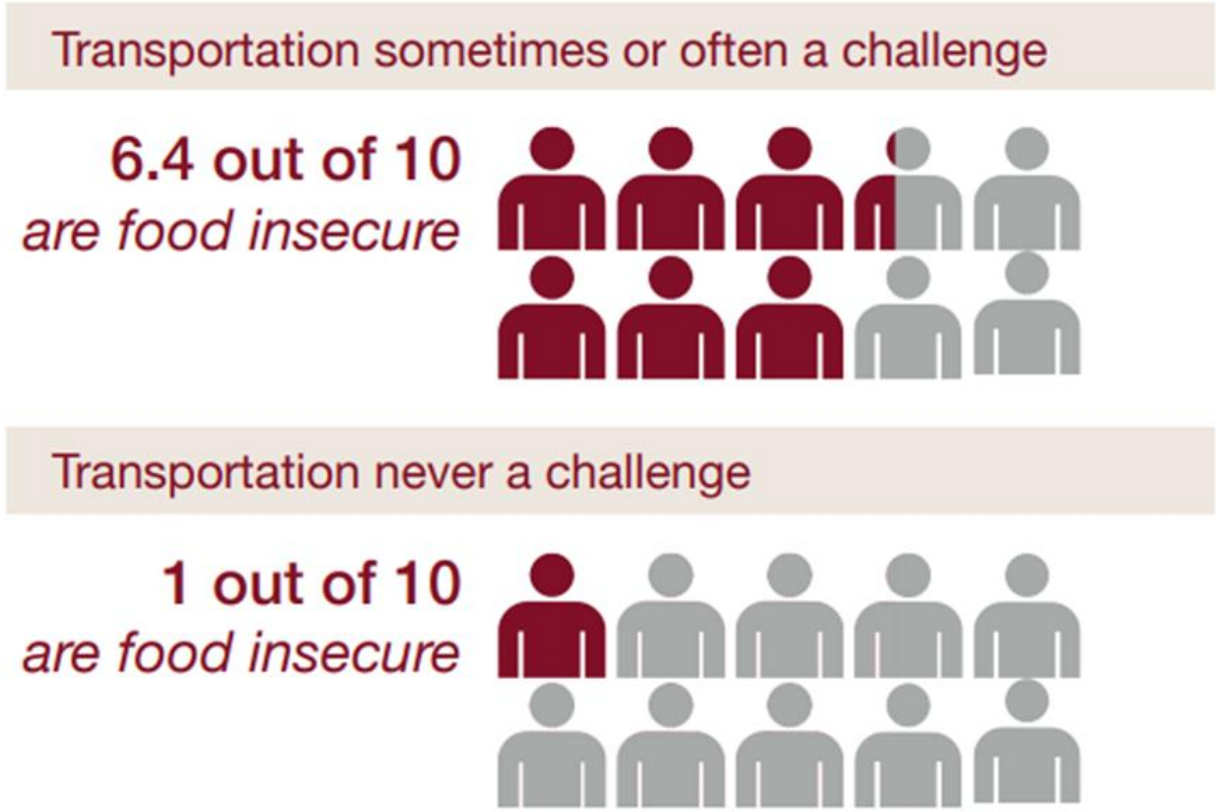
Lack of mobility

↓

Trouble with transportation

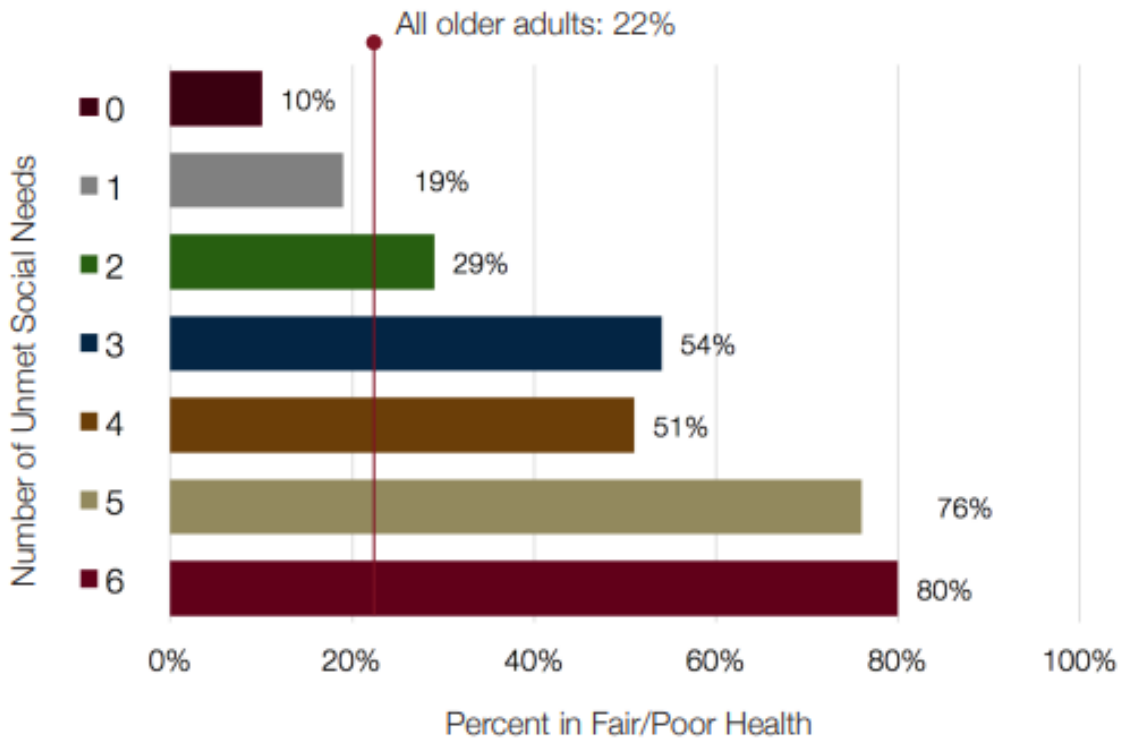
↓

Loss of social connectedness
Food insecurity



Cumulative increase in social needs leads to higher self-reported poor health

Exhibit 2. Fair/Poor Health Status among Older Adults by Number of Unmet Social Needs (n=1,590)



Note: Fair/poor health for each number of unmet needs differed significantly from 0 unmet needs at p<0.001.

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A COLLABORATION BETWEEN
AARP Foundation
IMPAQ INTERNATIONAL LLC

Social engagement, loneliness and dementia risk

Journal of Alzheimer's Disease 66 (2018) 1619–1633
DOI 10.3233/JAD-180439
IOS Press

The Association between Social Engagement, Loneliness, and Risk of Dementia: A Systematic Review and Meta-Analysis

Ross Penninkilampi[a], Anne-Nicole Casey[a,b], Maria Fiatarone Singh[c,d] and Henry Brodaty[a,b,e,*]
[a]*Dementia Centre for Research Collaboration, School of Psychiatry, University of New South Wales, Sydney, Australia*
[b]*Centre for Healthy Brain Ageing, School of Psychiatry, University of New South Wales, Sydney, Australia*
[c]*The University of Sydney, Faculty of Health Sciences and Sydney Medical School, Sydney, NSW, Australia*
[d]*Hebrew SeniorLife and Jean Mayer USDA Human Nutrition Center on Aging at Tufts University, Boston, MA, USA*
[e]*Academic Department for Old Age Psychiatry, Prince of Wales Hospital, Randwick, Australia*

31 cohort, 2 case-control studies
>2.3 million subjects

Increased dementia risk associated with:

Poor social network (RR 1.59, CI 1.31-1.96)
Poor social support (RR 1.28, CI 1.01-1.62)

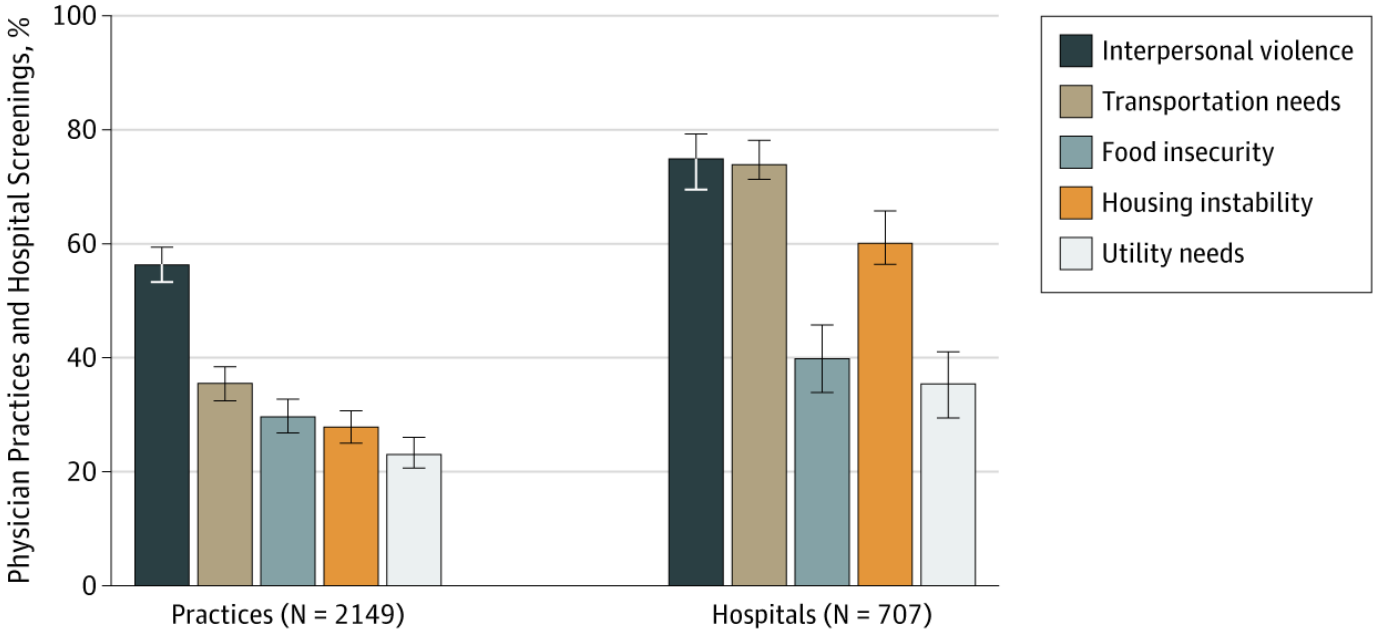
Good social engagement modestly protective

Loneliness non-significantly associated with increased risk

Prevalence of Screening for Food Insecurity, Housing Instability, Utility Needs, Transportation Needs, and Interpersonal Violence by US Physician Practices and Hospitals

JAMA Netw Open. 2019;2(9):e1911514. doi:10.1001/jamanetworkopen.2019.11514

33% of US clinical practices are not screening for SDH



Percentage of Physician Practices and Hospitals That Screen Patients for Each of 5 Social NeedsNumber of survey respondents from the 2017-2018 National Survey of Healthcare Organizations and Systems are unweighted. Percentages represent weighted data; error bars, 95% CIs.

Challenges to screening for SDH

- Required staff training, turnover
- Workflow optimization
- Z codes rarely used in billing (Z55-65)
  - Z 55.5 Less than high school diploma
  - Z58.6 Inadequate drinking supply
  - Z59.00 Homelessness unspecified
- Uncertain ability to address
- Unclear if patient wants an intervention
- Fear of stigmatization of patient

Ann Fam Med 2018, Popul Health Manag 2021, JAMA Network Open 2020

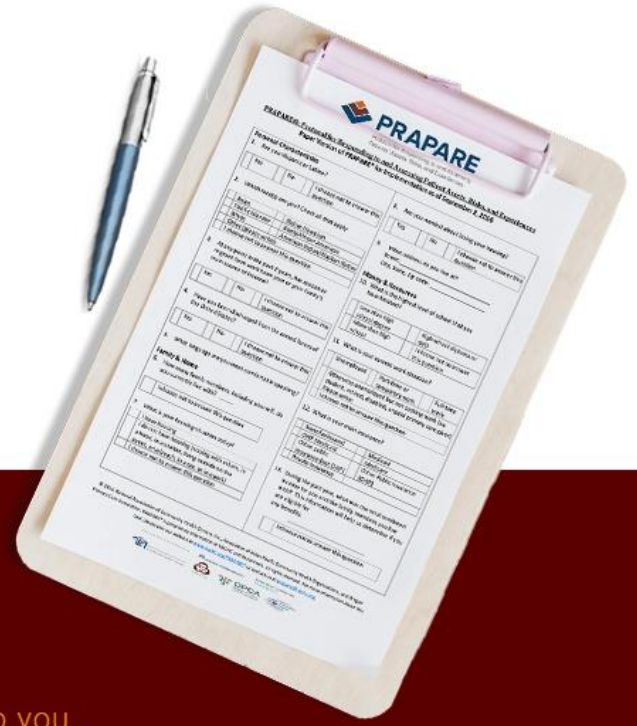
Standardized screening tools for SDH: PRAPARE

Protocol for Responding to and Assessing Patient Assets, Risks, and Experiences

PRAPARE Overview

Nationally standardized and stakeholder-driven, the Protocol for Responding to & Assessing Patients' Assets, Risks & Experiences (PRAPARE) is designed to equip healthcare and their community partners to better understand and act on individuals' social determinants of health (SDOH). PRAPARE, when paired with the Implementation and Action Toolkit, empowers users to leverage data to improve health equity at the individual, community, and systems levels.

LEARN MORE >



Download the PRAPARE Screening Tool

PRAPARE is now translated into over **25 languages** so you can connect with the diverse communities you serve!

SELECT A LANGUAGE

Core domains

1) Personal characteristics
2) Family and home
3) Money and resources
4) Social and emotional health

PRAPARE
Protocol for Responding to and Assessing Patients' Assets, Risks, and Experiences

PRAPARE®: Protocol for Responding to and Assessing Patient Assets, Risks, and Experiences
Paper Version of PRAPARE® for Implementation as of September 2, 2016

14. In the past year, have you or any family members you live with been **unable** to get any of the following when it was **really needed**? Check all that apply.

Yes	No	Food	Yes	No	Clothing
Yes	No	Utilities	Yes	No	Child Care
Yes	No	Medicine or Any Health Care (Medical, Dental, Mental Health, Vision)			
Yes	No	Phone	Yes	No	Other (please write):
		I choose not to answer this question			

15. Has lack of transportation kept you from medical appointments, meetings, work, or from getting things needed for daily living? Check all that apply.

	Yes, it has kept me from medical appointments or
	Yes, it has kept me from non-medical meetings, appointments, work, or from getting things that I need
	No
	I choose not to answer this question

Social and Emotional Health

16. How often do you see or talk to people that you care about and feel close to? (For example: talking to friends on the phone, visiting friends or family, going to church or club meetings)

	Less than once a		1 or 2 times a week
	3 to 5 times a week		5 or more times a
	I choose not to answer this question		

17. Stress is when someone feels tense, nervous, anxious, or can't sleep at night because their mind is troubled. How stressed are you?

	Not at all		A little bit
	Somewhat		Quite a bit
	Very much		I choose not to answer this question

Optional Additional Questions

18. In the past year, have you spent more than 2 nights in a row in a jail, prison, detention center, or juvenile correctional facility?

	Yes		No		I choose not to answer this

19. Are you a refugee?

	Yes		No		I choose not to answer this

20. Do you feel physically and emotionally safe where you currently live?

	Yes		No		Unsure
	I choose not to answer this question				

21. In the past year, have you been afraid of your partner or ex-partner?

	Yes		No		Unsure
	I have not had a partner in the past year				
	I choose not to answer this question				

The Accountable Health Communities Health-Related Social Needs Screening Tool

Living Situation

1. **What is your living situation today?**[3]
   - ☐ I have a steady place to live
   - ☐ I have a place to live today, but **I am worried** about losing it in the future
   - ☐ I do not have a steady place to live (I am temporarily staying with others, in a hotel, in a shelter, living outside on the street, on a beach, in a car, abandoned building, bus or train station, or in a park)

2. **Think about the place you live. Do you have problems with any of the following?**[4]
   CHOOSE ALL THAT APPLY
   - ☐ Pests such as bugs, ants, or mice
   - ☐ Mold
   - ☐ Lead paint or pipes
   - ☐ Lack of heat
   - ☐ Oven or stove not working
   - ☐ Smoke detectors missing or not working
   - ☐ Water leaks
   - ☐ None of the above

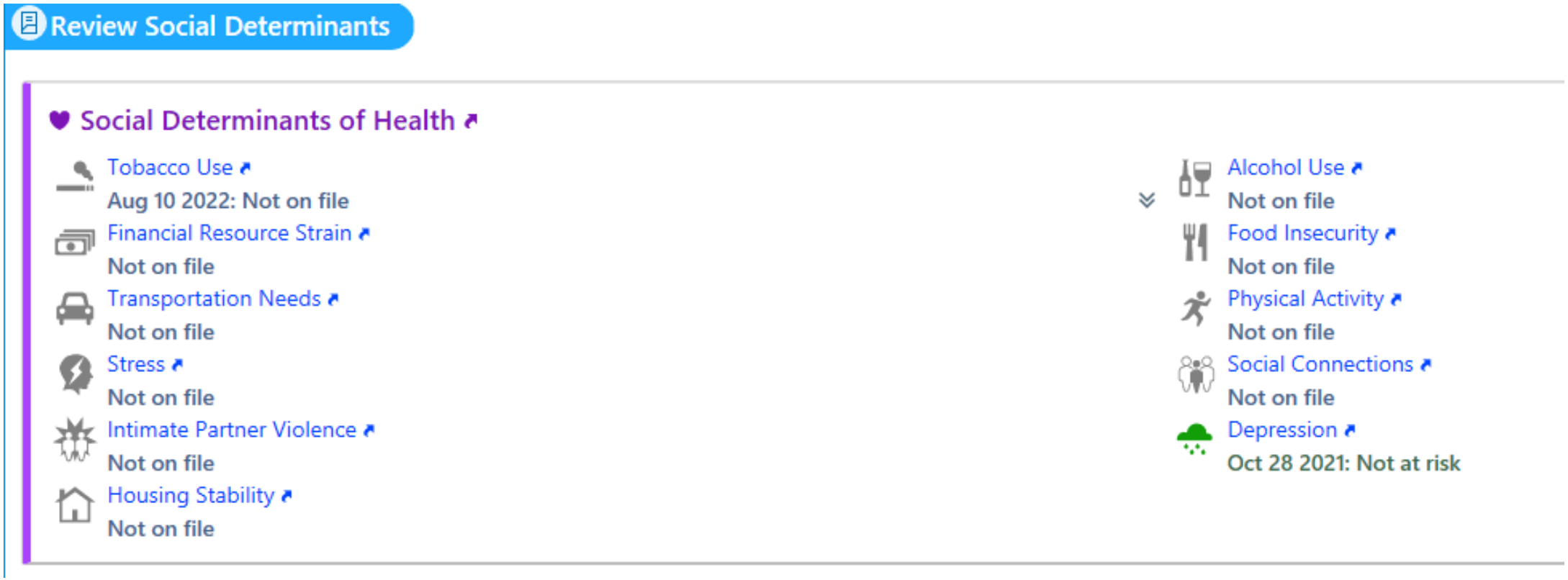
Food

Some people have made the following statements about their food situation. Please answer whether the statements were OFTEN, SOMETIMES, or NEVER true for you and your household in the last 12 months. [5]

3. **Within the past 12 months, you worried that your food would run out before you got money to buy more.**
   - ☐ Often true

https://innovation.cms.gov/files/worksheets/ahcm-screeningtool.pdf

EHR Capture of SDH



Social Connections

In a typical week, how many times do you talk on the phone with family, friends, or neighbors?

Never | Once a week | Twice a week | Three times a week | More than three times a week | Patient refused

How often do you get together with friends or relatives?

Never | Once a week | Twice a week | Three times a week | More than three times a week | Patient refused

How often do you attend church or religious services?

Never | 1 to 4 times per year | More than 4 times per year | Patient refused

Do you belong to any clubs or organizations such as church groups, unions, fraternal or athletic groups, or school groups?

Yes | No | Patient refused

How often do you attend meetings of the clubs or organizations you belong to?

Never | 1 to 4 times per year | More than 4 times per year | Patient refused

Are you married, widowed, divorced, separated, never married, or living with a partner?

Married | Widowed | Divorced | Separated | Never married | Living with partner | Patient refused

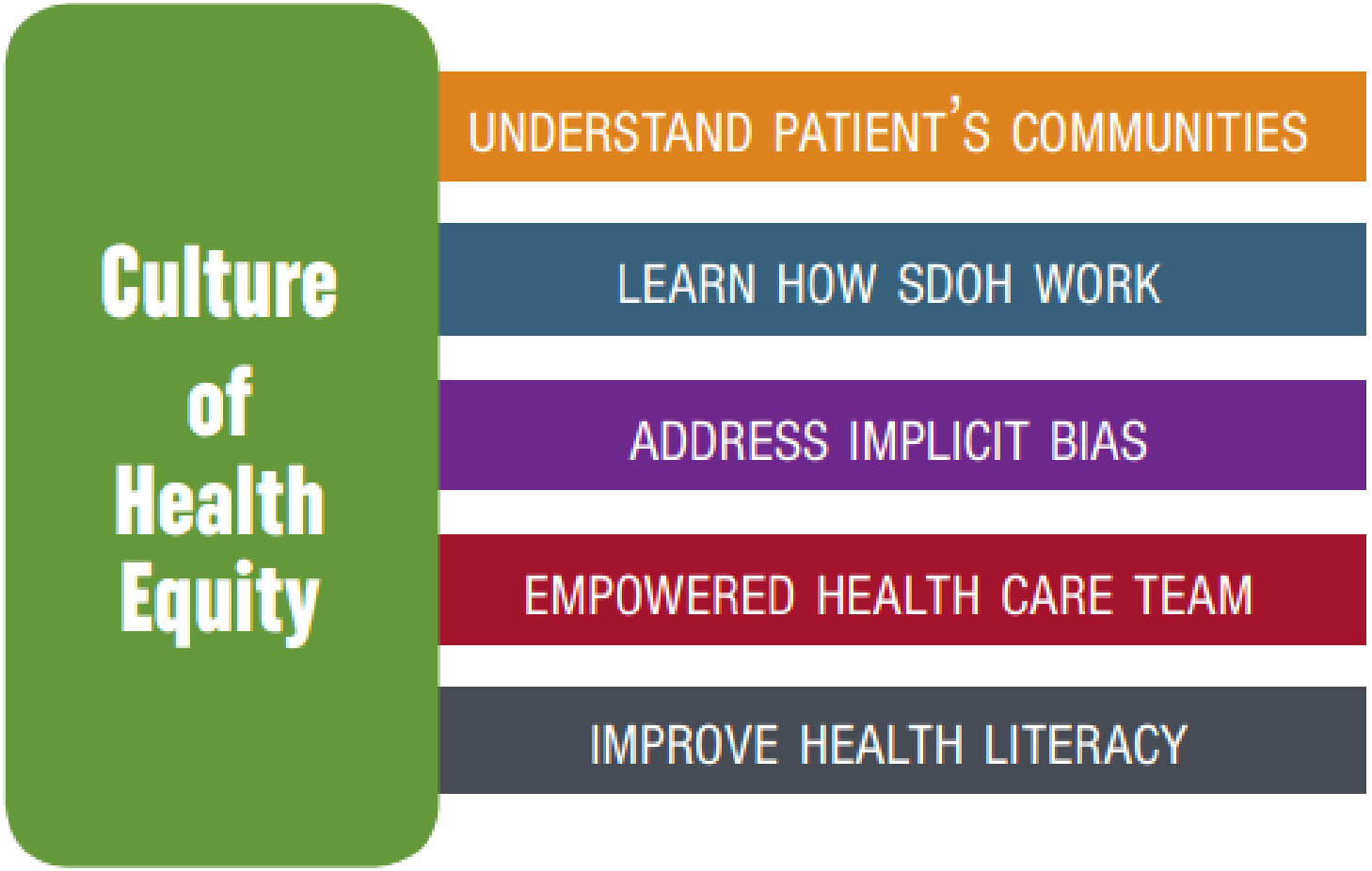
Financial Resource Strain

How hard is it for you to pay for the very basics like food, housing, medical care, and heating?

Very hard | Hard | Somewhat hard | Not very hard | Not hard at all | Patient refused

Overcoming barriers

The EveryONE Project™
Advancing health equity in every community
AN ACADEMY OF FAMILY PHYSICIANS



Understand your community

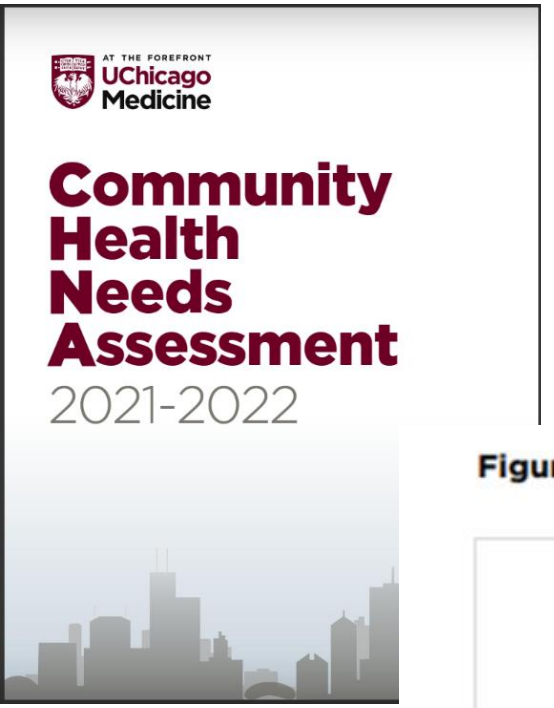


Figure 5. Tell us what you think are the 5 most important health problems in the area where you live for Seniors (65 years and up).

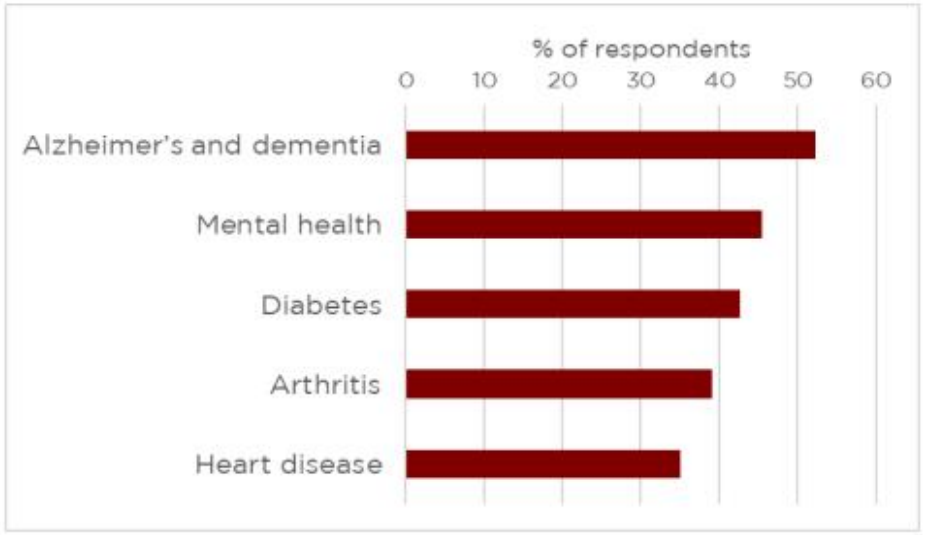
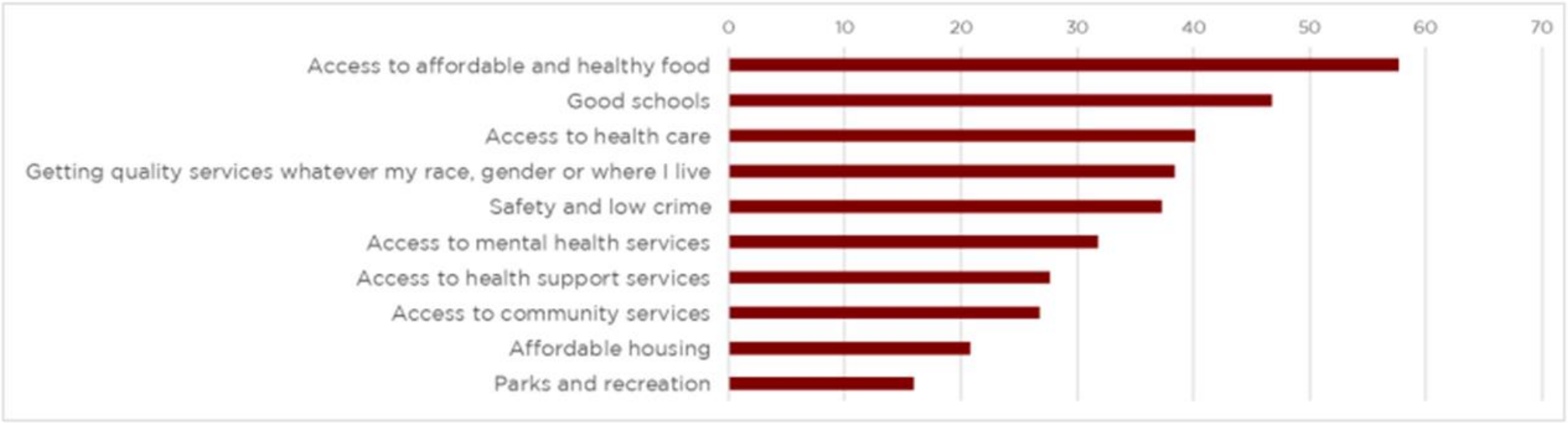
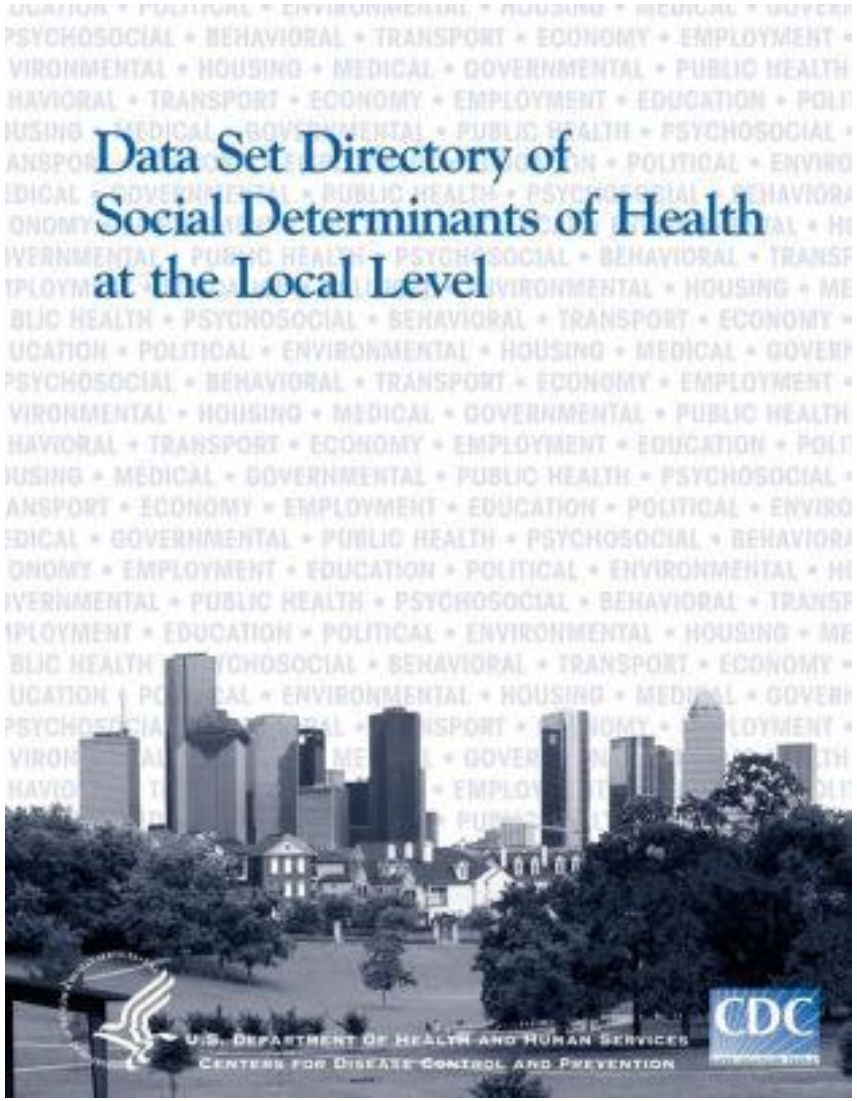


Figure 6. What do you think are the most important things for a healthy community?



Data Sets are available to assess SDH at the local level



Dimension
Economy
Employment
Education
Political
Environmental
Housing
Medical
Governmental
Public Health
Psychosocial
Behavioral
Transport

Components and Indicators	Data Sources and Notes
1. Income	
A. Earned income	
1. Median and per capita annual income	Census Bureau (www.census.gov).
2. Mean hourly and annual wage	Bureau of Labor Statistics (stat.bls.gov/oes/home.htm). Data by occupation available in downloadable Excel files.
3. Hourly wage, union, and nonunion workers	Union Membership and Earnings Data Book (www.bna.com/bnaplus/labor/laborrpts.html). Separate tables for public and private sector workers and for manufacturing and nonmanufacturing workers. Customized reports available for any or all years since 1983.
4. Per capita personal income	Bureau of Economic Analysis (www.bea.doc.gov/bea/regional/reis). Downloadable compressed comma-separated-value files.
B. Disposable income	
1. Median and per capita Effective Buying Index	Demographics U.S.A (www.tradedimensions.com/p_demographics.html). Effective Buying Index represents money income minus taxes. Data available on CD-ROM.
C. Income distribution	
1. Gini coefficient of income inequality; 90%ile/10%ile ratio	Census Bureau (www.census.gov).

https://www.cdc.gov/dhdsp/docs/data_set_directory.pdf

Empower and engage the healthcare team

Ambulatory Care Coordination Team (ACCT)

Identification of “at risk” patients

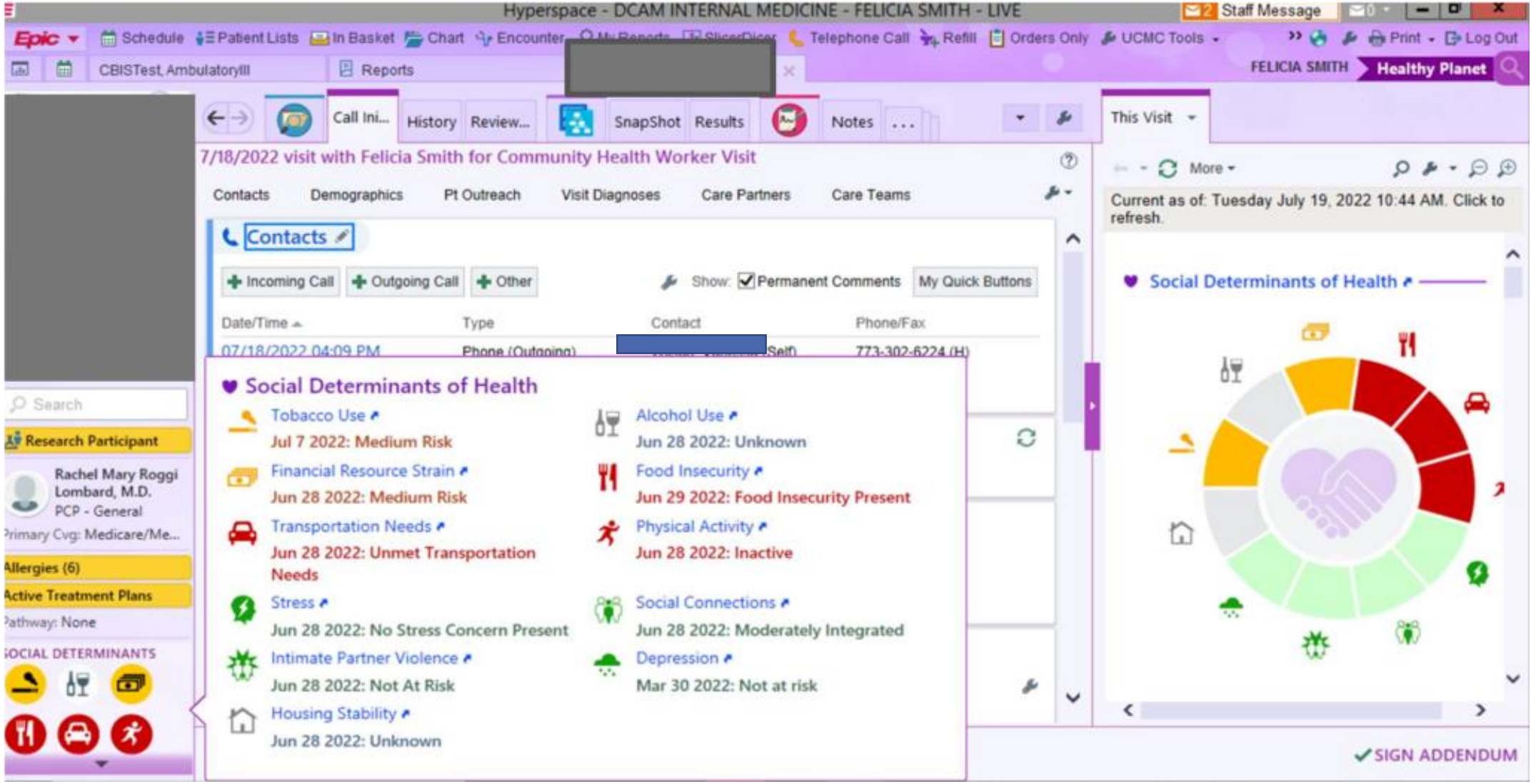
Direct provider referral

High utilizer lists (inc. ER)

Patient PING/Bamboo Health

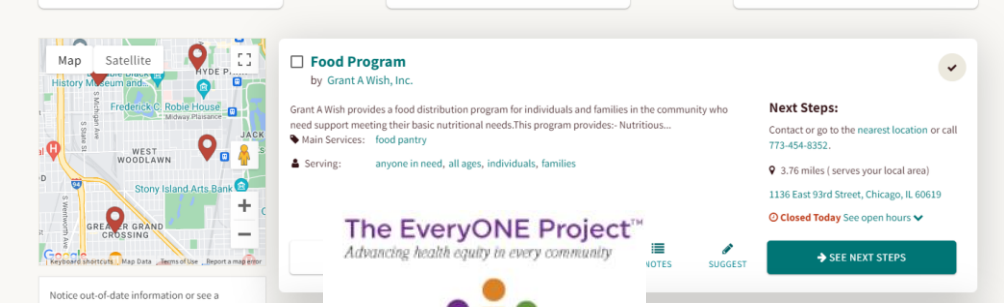
Medicare annual wellness visits

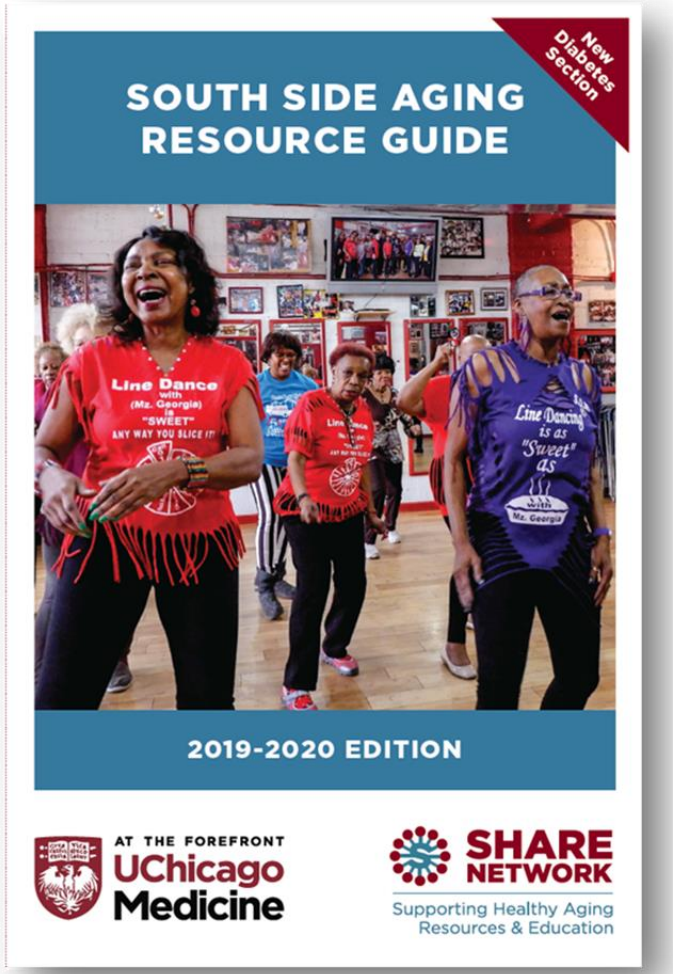
Document and track in the EHR



Interventions:
Social prescribing

NOWPOW





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AmJPrevMed. 2018

Interventions: Meal programs

Reduce food insecurity, isolation, loneliness and depression and improve diet quality

More Than A Meal? A Randomized Control Trial Comparing the Effects of Home-Delivered Meals Programs on Participants' Feelings of Loneliness

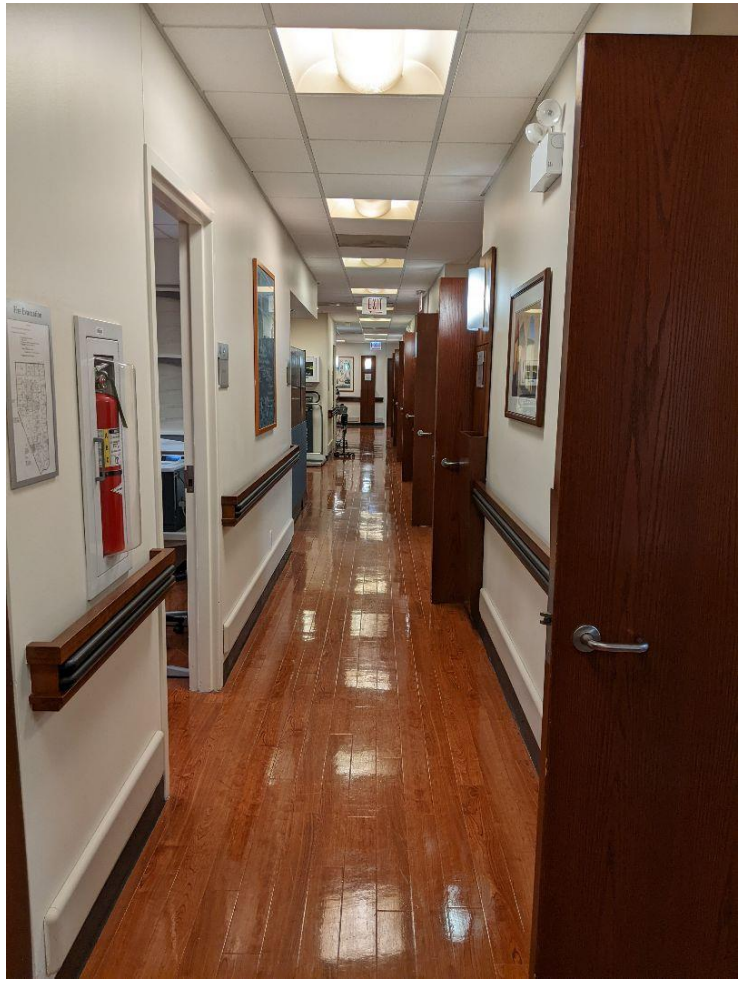
Kali S. Thomas,[1,2] Ucheoma Akobundu,[3] and David Dosa[1,2]

[1]Department of Veterans Affairs Medical Center, Providence, Rhode Island. [2]School of Public Health, Brown University, Providence, Rhode Island. [3]Meals on Wheels America, Arlington, Virginia.

NUTRITION SERVICES INCENTIVE PROGRAM OF THE OLDER AMERICANS ACT AND STATES

As of March 30, 2020

Interventions: Practice-level



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Interventions: Community education

SHARE NETWORK
Supporting Healthy Aging Resources & Education

Dr. Katherine Thompson

Geriatric Workforce Enhancement Program

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SHARE NETWORK
Supporting Healthy Aging Resources & Education

Summary

- SDH play a significant role in attaining healthy aging and longevity
- Healthcare systems are increasingly evaluating the impact of and interventions required to treat SDH
- Geriatrics and interdisciplinary primary care practices play an influential role in addressing SDH in population health

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